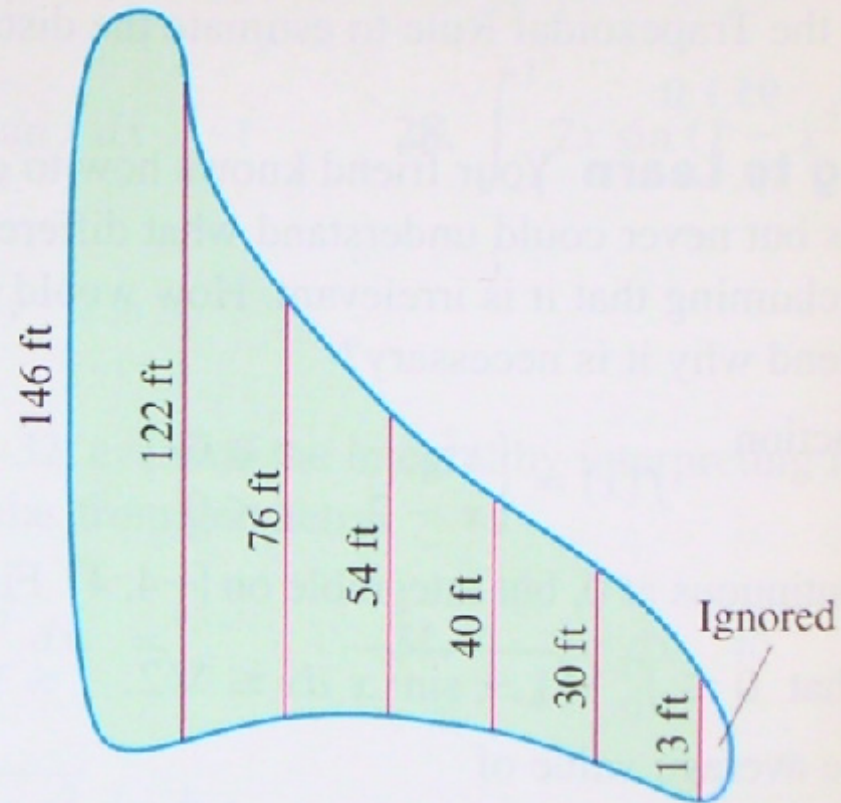


**Filling a Swamp** A town wants to drain and fill the small polluted swamp shown below. The swamp averages 5 ft deep. About how many cubic yards of dirt will it take to fill the area after the swamp is drained?



Horizontal spacing = 20 ft

$$\frac{20}{3} (13 + 4(30) + 2(40) + 4(54) + 2(76) + 4(122) + 146)$$

$$\frac{20}{3} (1215)$$

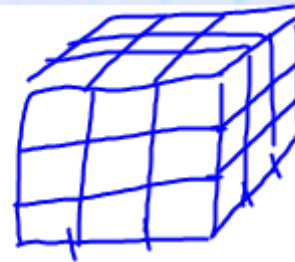
$$A = 8100$$

$$V = 8100 (5)$$

$$V = 40,500 \text{ ft}^3$$

$$1,500 \text{ yd}^3$$

$\div 27 \rightarrow$



## Sect. Review Ch. 5

#1-6, 9, 12(2), 13-32( $\frac{1}{2}$ ), 33, 38-40, 54